Colloquium

Computer Science Department, Oklahoma State University

Dr. David P. Miller
Wilkonson Chair and Professor of Engineering
University of Oklahoma
3:25pm - 4:25pm, Thursday, March 26th, 2009
310 MSCS, Stillwater; 222 NCB, Tulsa

Teaching Programming through Robotics & Robotics Outreach

Abstract

Computers and software have integrated themselves into almost every aspect of daily life. At the same time, enrollments in technical fields, and especially computer science, are down. This talk will discuss the use of a particular set of robotics technology and programming tools to help encourage students (from middle school on up) to learn and enhance their programming skills. If more students know how to program before entering college, they will be more able to, and probably interested in, pursuing a STEM discipline -- including CS. This talk will also discuss some details of the CBC robot controller, and KISS-C programming IDE that incorporate standard tools such as GCC, QT and OpenGL to provide a friendly, easy and engaging way to learn standard procedural programming.

Biography: Dr. David P. Miller is the Wilkonson Chair and Professor of Engineering at OU. Dr. Miller has appointments in the Aerospace & Mechanical Engineering, Computer Science and Bioengineering programs. He received his BA in Astronomy form Wesleyan University, and his Ph.D. in Computer Science from Yale. Before coming to OU, he taught in the Computer Science department at Virginia Tech, and then spent several years at the NASA Jet Propulsion Lab and NASA Ames Research Center supporting the Mars rover programs. He is a co-founder of the educational non-profit KISS Institute for Practical Robotics (KIPR), and helps administer KIPR's Botball Robot Education Program. Miller's current research emphasis is in the areas of assistive technology, planetary robotics and engineering education.

(Refreshments will be served.)